Shoreline Clean-Up

THE FACTS

The Clean Nova Scotia Foundation

April 1989

89-04129/

Overview

In keeping with the goals of The Clean Nova Scotia Foundation, the Shoreline Clean-Up Programme was designed to provide a practical demonstration of enhancing our visual environment while informing the public of the impact of littering.

The timing for this pilot project coincided with a National Workshop organized by Fisheries and Oceans Canada held in Halifax, May 16 - 18, 1989, on Plastic Debris and Lost and Abandoned Fishing Gear in the Aquatic Environment.

Members of The Clean Nova Scotia Foundation were invited to visit their favourite stretch of shoreline equipped with garbage bags to collect litter, and data sheets to record their findings. Many members made this a family outing, while others recruited the help of enthusiastic groups of young people and friends. With a membership that extends throughout Nova Scotia, most regions were covered during the last half of April.

All returned data sheets were expertly completed. Several contained additional comments and data. Many members wrote accompanying letters stating how much they had enjoyed participating and their surprise at the composition of the debris that had washed ashore.

This enthusiasm and interest was reflected by the media which bolstered the campaign. Community newspapers passed on the invitation to their readers to become involved (some providing copies of the Foundation's data sheet). Radio stations gained responses from participants (including a Maritime-wide phone-in survey) and television provided sunny beach scenes of "pickers" and their spoils.

The resultant data presented to the Workshop provided a practical insight into the range of aquatic debris that is washing ashore and deposited by beach users in Nova Scotia. The Clean Nova Scotia Foundation will use this experience to evaluate the organization of future clean-up campaigns and to develop recommendations for litter prevention techniques.

Data Capsule

One hundred and nineteen Clean Nova Scotia Foundation members and friends visited twenty-four locations and recorded 10,087 items spread along a combined total shoreline of almost 10 kilometres. Plastics overwhelmingly accounted for the majority of items at 62% (plastic and styrofoam) with metal, glass and paper items at 12%, 11% and 10% respectively.

Litter was also collected and recorded by some "pickers" from areas above the high water mark. The evidence of this is illustrated by the findings of 437 beverage cans and 379 beverage bottles (plus 659 glass pieces). The majority of these previously contained alcoholic drinks.

Small pieces of polystyrene foam led the count at 849 followed by pieces of plastic at 774. The remaining top ten items include: plastic rope (2 ft. and shorter) - 686; glass pieces -659; beverage cans - 437; beverage bottles - 379; paper pieces - 378; plastic tampon applicators - 375; plastic caps/lids - 374; and, plastic rope (longer than 2 ft.) - 349.

Not included in the count were six dead seagulls, some of which were covered in oil and one entangled in heavy plastic, two deer carcasses and one fish carcass.

Several peculiar items were encountered such as a street sign, a shopping cart and a bottle containing a long cigarette butt with a $5.00 bill taped to the outside and a note from someone who had just given up smoking - dated October 88!

The Facts

Number of "pickers"	119
Length of shoreline covered	9.6 km.
Number of garbage bags filled	130
Total number of items	10,087

Compositions of trash
(based on number of items collected)

Item	Rank	%	# of items
Plastic	1	48	4,843
Styrofoam	2	14	1,406
Metal	3	12	1,169
Glass	4	11	1,082
Paper	5	10	1,018
Wood	6	2	261
Rubber	7	2	191
Cloth	8	1	117

For counts of individual items see Appendix 1 for complete listing.

Recycled Items

Aluminum Cans	114
Glass Bottles	197
Newspapers	18

Conclusion

Over the past two decades, it is obvious that plastics have become prevalent as a multi-purpose material. Previously, beach combers would probably have noted that wood was the most evident debris on the shore.

Many items were consumer products that are found in the domestic waste stream and probably were dumped overboard or originated from "over-the-cliff" dumps. The incredible number of tampon applicators serves as a comment on local sewage disposal practices. The alcoholic beverage containers found above the high water mark attests to "beach party" users.

It is worthwhile to reflect that the very nature of plastics in being lightweight and therefore able to float, enabled these items to be washed ashore. They perhaps represent the tip of the iceberg when it comes to assessing the total amount of trash that is ending up in our oceans and waterways. It is easy to extrapolate that an incredible amount of garbage covers the ocean floor.

Many of the collectors commented on the shortage of waste receptacles at beach access points, and when provided, were poorly maintained.

Total Items Collected

PLASTIC	Total # of Items
bags:	
trash	285
salt	59
other	280
bottles:	
beverage, soda	228
bleach, cleaner	111
oil, lube	144
other	86
buckets	49
caps, lids	374
cups, spoons, forks, straws	249
diapers	7
disposable lighters	36
fishing line	50
fishing net:	
longer than 2 feet	30
2 feet or shorter	77
floats & lures	9
hardhats	6
light sticks	4
milk, water gallon jugs	63
pieces	774
pipe thread protector	9
rope:	
longer than 2 feet	349
2 feet or shorter	689
sheeting:	
longer than 2 feet	42
2 feet or shorter	110
6-pack holders	42
strapping bands	67
syringes	1
tampon applicators	375
toys	57
vegetable sacks	5
"wrist protection" rings	1
other (specify)	241

GLASS	Total # of Items
bottles:	
beverage	379
food	14
other (specify)	1
fluorescent light tubes	~~1~~
light bulbs	9
pieces	659
other (specify)	20

STYROFOAM® (or other plastic foam)	Total # of Items
buoys	26
cups	202
egg cartons	9
fast-food containers	118
meat trays	50
pieces:	
larger than a baseball	108
smaller than a baseball	849
other (specify)	44

RUBBER	
balloons	18
gloves	20
tires	22
other (specify)	131

METAL	
bottle caps	282
cans:	
aerosol	32
beverage	437
food	35
other	40
crab/fish traps	4
55 gallon drums	
rusty	13
new	1
pieces	148
pull tabs	43
wire	26
other (specify)	108

PAPER	
bags	56
cardboard	74
cartons	122
cups	67
newspaper	41
pieces	378
other (specify)	280

WOOD (leave driftwood on the beach)	
crab/lobster traps	11
crates	9
pallets	3
pieces	228
other (specify)	10

CLOTH	
clothing/pieces	117

APPENDIX 2

Total Other Items

Plastic	
Pen	8
Sanitary Pad Covers	46
Flooring	22
Shotgun Shells	65
Chip Bags	16
Dishwashing Rack	1
Glue Stick	1
Laundry Baskets	2
Cigar Tips	9
Combs	8
Crates	9
Signs	2
Lobster/Fish tags	42
Gloves	5
Boat Parts	3
Tape	1
	179

Glass	
Cosmetic	1
Pottery	19
	20

Wood	
Rafts	2
Paint Brushes	3
Couch Frame	1
Hoop	1
Paint Scraper	2
Hockey Stick	1
	10

Styrofoam	
Pop Labels	32
Insulation	10
Cooler Cover	1
Seat	1
	44

Paper	
Cigarette Filters	255
Air Filter	1
Tea Bag	1
Shotgun Shell Cases	8
Kleenex	15
	280

Rubber	
Rubber Suit	1
Floor Mat	1
Broom	1
Tire Pieces	33
Hose Pieces	12
Nose Plugs	1
Pants	1
Boots	5
Rubber Pieces	21
Foam	1
Lobster Bands	30
Shoe Sole	2
Nipple	1
Sandles	4
Condoms	16
Rubber Mask	1
	131

Metal	
Aluminum Plates	3
Aluminum Pieces	28
Aluminum Ashtrays	4
Muffler	2
Foil Wrap Pieces	31
Nails	6
Iron Molding	2
Bucket	1
Mattress	1
Gas Tank	1
Battery	1
Motor	1
Iron Pipe	1
Car Parts	18
Lobster Licence Tags	5
Lawn Chair	1
Water Bowl	1
Bullet	1
Metal Coat Hanger	1
	108

APPENDIX 3

Peculiar Items

Plastic Gun Shells
Muffler
Strip of Tile
Street Sign
Shopping Cart
Oil Drum
Lawn Chairs
Shampoo Bottles
Couch
Golf Balls
"Krazy Karpets" for snow sliding
Aluminum Pie Plates
Mat
Bed Springs
Tampon Applicators
Large Electrical Insulators
Bread Racks
Used Disposable Medical Hat & Mask
Fibreglass Insulation
Hockey Helmet
Lighters
Balloons
Sneaker
Cigarette Butt with a $5 Bill taped to outside from someone who had just given up smoking - dated October/88

APPENDIX 4

Collectors Named on Data Sheets

1st Margaree Forks Pathfinders
1st Pt. Hood Brownies
2nd Bedford Girl Guides
43rd Cub Pack
Barrett, Claire
Baxter, Charles
Bradshaw, Catherine
Brill, Margaret
Bush, Flora K.
Butler, Ishbel
Buxton, Richard
Chandler, Julie
Charles, John
Collier, Terry & Paula
Del Zoppo, E.
Farrell, T.C.
Gagne, Claude
Guscott, Bob
Harrigan, Sara
Hayes, Sharon
Hull, Maureen
Langley, Marie
Leahey, Marion
Longuers, Mark
Longuers, Sarah
MacDonald, Rebecca Lynne
MacInnis, Pamela
Manzer, Audrey
Mastin, Rob
Meisner, Camilla
Milligan, John
Morris, Linda
Newell, Jo Ann
Pictou Island School Children
Raoul, Dianne
Sampson, Janice & Tony
Santilli, Vincent & Family
Steele, Bob & Mary
Steele, James & Ann
Thorpe, John
Waite, Jack
Wheeler, Natalie
Wolter, Helmut & Edit

Locations Visited

Halifax County	Point Pleasant Park, Sackville River, Long Beach - Chezzetcook, Northwest Arm - Dingle, Crystal Crescent Beach - Sambro, NcNab's Island, Conrad's Beach, Mason's Point, Eastern Passage, Oakfield, Grand Lake
Lunenburg County	Goreham Point, LaHave River, Crescent Beach, Bush Island, Upper Blandford
Pictou County	Pictou Harbour, Pictou Island
Yarmouth County	Pinkeys Point Beach, Overton
Inverness County	Point Tupper, Margaree Harbour, Port Hood
Richmond County	Point Michaud
Guysborough County	Canso

The Clean Nova Scotia Foundation

The Clean Nova Scotia Foundation is dedicated to the enhancement and preservation of our beautiful visual environment. We are an impartial non-profit public education and resource centre registered as a Canadian charity. The Foundation represents the concerns of individuals, groups, industry and the various levels of government. Financial support is provided through membership fees, donations and grants. Our current objectives include the promotion of recycling and the creation of litter prevention programmes.

If you wish to do more to help keep Nova Scotia clean, please contact the Foundation at:

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